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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/701,530	11/06/2003	Chiou-Hwang Lee	LEEC3077/EM 8133	
23364 75	590 12/27/2005	EXAMINER		INER
BACON & THOMAS, PLLC			NGUYEN, CAM N	
625 SLATERS LANE FOURTH FLOOR		ART UNIT	PAPER NUMBER	
ALEXANDRIA			1754	

DATE MAILED: 12/27/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)		
Office Action Summary		10/701,530	LEE ET AL.		
		Examiner	Art Unit		
		Cam N. Nguyen	1754		
The MAILING DATE of this Period for Reply	communication app	ears on the cover sheet with the	correspondence address		
A SHORTENED STATUTORY PI WHICHEVER IS LONGER, FROI - Extensions of time may be available under the after SIX (6) MONTHS from the mailing date - If NO period for reply is specified above, the - Failure to reply within the set or extended per Any reply received by the Office later than the earned patent term adjustment. See 37 CFR	M THE MAILING DA the provisions of 37 CFR 1.13 of this communication. maximum statutory period value find for reply will, by statute, ree months after the mailing	ATE OF THIS COMMUNICATIO 36(a). In no event, however, may a reply be tin will apply and will expire SIX (6) MONTHS from	N. mely filed the mailing date of this communication. ED (35 U.S.C. § 133).		
Status					
1) Responsive to communicat	ion(s) filed on <u>10/0</u> 4	1/05 (an election).			
2a) ☐ This action is <b>FINAL</b> .	This action is <b>FINAL</b> . 2b)⊠ This action is non-final.				
3) Since this application is in c	condition for allowar	nce except for formal matters, pre	osecution as to the merits is		
closed in accordance with t	he practice under E	x parte Quayle, 1935 C.D. 11, 4	53 O.G. 213.		
Disposition of Claims					
4)⊠ Claim(s) <u>1-4</u> is/are pending	in the application.				
4a) Of the above claim(s)	• •	vn from consideration.			
5) Claim(s) is/are allow	ed.				
6) Claim(s) 1-4 is/are rejected					
7) Claim(s) is/are object					
8) Claim(s) are subject	to restriction and/or	r election requirement.			
Application Papers					
9)☐ The specification is objected	I to by the Examine	r.			
10)⊠ The drawing(s) filed on <i>origi</i>	nally filed is/are: a)	☑ accepted or b)☐ objected to	by the Examiner.		
Applicant may not request that	any objection to the	drawing(s) be held in abeyance. Se	e 37 CFR 1.85(a).		
		ion is required if the drawing(s) is ob	•		
11)☐ The oath or declaration is ob	ejected to by the Ex	aminer. Note the attached Office	Action or form PTO-152.		
Priority under 35 U.S.C. § 119					
12)⊠ Acknowledgment is made of a)⊠ All b)□ Some * c)□ No		priority under 35 U.S.C. § 119(a	)-(d) or (f).		
<ol> <li>1.</li></ol>	e priority documents	s have been received.			
		s have been received in Applicat	· · · · · · · · · · · · · · · · · · ·		
		ity documents have been receive	ed in this National Stage		
application from the li		• • • • • • • • • • • • • • • • • • • •			
" See the attached detailed Off	ice action for a list (	of the certified copies not receive	<b>.</b> D. C.		
Attachment(s)					
1) Notice of References Cited (PTO-892)		4) Interview Summary			
<ol> <li>Notice of Draftsperson's Patent Drawing</li> <li>Information Disclosure Statement(s) (PT Paper No(s)/Mail Date</li> </ol>		Paper No(s)/Mail Di 5) Notice of Informal F 6) Other:	ate Patent Application (PTO-152)		

Application/Control Number: 10/701,530 Page 2

Art Unit: 1754

## **DETAILED ACTION**

# Response to Election/Restriction

1. Applicant's election <u>without traverse</u> of Group I, claims 1-4, in the reply filed on October 04, 2005 is acknowledged.

## Response to Amendment

2. Applicants' amendment and remarks, filed October 04, 2005, has been made of record and entered. Claims 5-10 have been canceled.

Claims 1-4 are currently pending the application and under consideration.

# **Claim Objections**

- 3. Claims 1 & 3 are objected to because of the following informalities:
- A. In claim 1, line 1, "An catalyst suitable for" should be changed to --A catalyst for-
- B. In claim 1, line 2, --, -- should be inserted after "carrier".
- C. In claim 1, line 4, "characterized in that" is suggested changed to –wherein--.
- D. In claim 3, line 1, "aid" should be changed to –said--.Appropriate correction is required.

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#### 1754

## Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

5. Claims 1-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tennent et al., "hereinafter Tennent", (US Pat. 4,892,857).

Tennent discloses an apparatus (or a composition) which is consisting essentially of: (a) a substrate selected from the group including ceramic material; (b) a first layer, and (c) a second metal-containing layer superposed on said first layer, etc. (see col. 11, claim 1). The second metal-containing layer consists essentially of elements selected from a group including Pt and Re (see col. 11, claim 2). The substrate has a composition which consists essentially of metal oxides including 22 to 30 weight %

Art Unit: 1754

 $A_2O_3$ , 2.1 to 13.5 weight % MgO, 0 to 11.9 weight % CuO, and 0 to 12.1 weight 5 ZnO (see col. 12, claim 5).

Regarding claims 1, 3, & 4, the difference between the claimed catalyst and that disclosed by Tennent, is that Tennent does not disclose the Pt and Re amounts. It would have been *prima facie obvious* to one of ordinary skill in the art at the time the invention was made to have predetermined optimum amounts of Pt and Re to result in an effective catalyst because it is a result effective variable and since it involves only routine experimentation of one having the ordinary skill in the art to do so, and in view of *In re Boesch*.

Regarding claim 2, Tennent does not disclose the claimed copper concentration. It would have been prima facie *obvious* to one of ordinary skill in the art at the time the invention was made to have optimized the copper concentration of Tennent, in view of *In re Boesch*.

### Citations

6. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. All references are cited for related art. See PTO-892 Form prepared attached.

## Conclusion

7. Claims 1-4 are pending. Claims 1-4 are rejected. No claims are allowed.

Application/Control Number: 10/701,530

Art Unit: 1754

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Primary Examiner Cam N Nguyen, whose telephone number is 571-272-1357. The examiner can normally be reached on M, W, R, & F, 9:00 AM - 6:30 PM.

Page 5

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stanley Silverman, can be reached on 571-272-1358. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free)

Nguyen/cnn Own

December 21, 2005

CAM N. NOUYEN PRIMARY EXAMINER

Art Unit - 1754